

Table 8.1 Hunger risk classification in children aged 1 – 9 years nationally and by area of residence: South Africa 1999

| Hunger risk classification (%) | Area of Residence | | | | | | |
|--------------------------------|-------------------|--------------|----------------|--------|-------|-------|------|
| | Com/rcial Farms | Formal Urban | Informal Urban | Tribal | Urban | Rural | RSA |
| Number (n) | 299 | 1060 | 287 | 1089 | 1347 | 1388 | 2735 |
| Food secure | 23 | 41 | 21 | 11 | 36 | 14 | 25 |
| At risk of hunger | 29 | 23 | 18 | 23 | 22 | 24 | 23 |
| Experience hunger | 48 | 37 | 61 | 66 | 42 | 62 | 52 |

* Significant difference between urban and rural groups, $p < 0.01$, Chi-square test

** Significant difference between 4 types of residence, $p < 0.01$, Chi-square test

Table 8.2 Hunger risk classification in children aged 1 – 9 years nationally and by age: South Africa 1999

| Hunger risk classification (%) | Age groups | | | |
|--------------------------------|-------------|-------------|-------------|------|
| | 1 - 3 Years | 4 - 6 Years | 7 - 9 Years | RSA |
| Number (n) | 1251 | 1034 | 450 | 2735 |
| Food secure | 24 | 25 | 26 | 25 |
| At risk of hunger | 22.5 | 22 | 27 | 23 |
| Experience hunger | 53 | 53 | 47 | 52 |

* No significant difference among age groups, Chi-square test used

Table 8.3 Hunger risk classification in children aged 1 – 9 years nationally and by province: South Africa 1999

| Hunger risk classification (%) | Province | | | | | | | | | |
|--------------------------------|----------|------|--------|------|------|------|------|------|------|------|
| | EC | FS | G/TENG | KZN | M/GA | NC | NP | NW | WC | RSA |
| Number (n) | 398 | 209 | 409 | 525 | 150 | 144 | 332 | 226 | 342 | 2735 |
| Food secure | 4.3 | 45.5 | 36.7 | 26.7 | 21.3 | 13.2 | 19.3 | 13.3 | 39.8 | 25.0 |
| At risk of hunger | 12.6 | 16.8 | 21.5 | 25.9 | 26.0 | 23.6 | 26.2 | 25.2 | 29.0 | 22.9 |
| Experience hunger | 83.2 | 37.8 | 41.8 | 47.4 | 52.7 | 63.2 | 54.5 | 61.5 | 31.3 | 52.2 |

* Significant difference between provinces, $p < 0.01$, Chi-square test

Table 8.4 Hunger risk classification as related to anthropometric status of children aged 1 – 9 years nationally and by area of residence: South Africa 1999

| Hunger risk classification | | Area of Residence [Mean (sd)] | | | | | | |
|---|--------------------------|-------------------------------|------------------------|----------------------|-----------------------|-------------------------|-------------------------|--------------------------|
| | | Com/rcial Farms | Formal Urban | Informal Urban | Tribal | Urban | Rural | RSA |
| Total n [food secure (n); risk of hunger (n); experience (n)] | | 277 (66; 80; 131) | 956 (388; 220; 357) | 268 (53; 48; 167) | 960 (107;212; 641) | 1233 (441; 268; 524) | 1237 (173; 292; 772) | 2735 (683; 625; 1427) |
| H/A | Food secure | -0.9* (1.4) [a] | -0.3** (1.4) [a] | -1.0 (1.3) | -1.2 (1.4) | -0.4** (1.4) [a] | -1.1 (1.4) | -0.6** (1.5) [a] |
| | At risk of hunger | -1.6 (1.4) [b] | -0.8 (1.4) [b] | -0.8 (1.4) | -1.0 (1.6) | -0.8 (1.4) [b] | -1.1 (1.6) | -1.0 (1.5) [b] |
| | Experience hunger | -1.2 (1.5) [a][b] | -1.0 (1.5) [b] | -0.9 (1.4) | -1.1 (1.5) | -1.0 (1.5) [b] | -1.1 (1.5) | -1.1 (1.5) [b] |
| W/A | Food secure | -0.7 (1.2) | 0.0** (1.3) [a] | -0.2 (1.4) | -0.8 (1.1) | -0.1** (1.3) [a] | -0.7 (1.1) | -0.2** (1.3) [a] |
| | At risk of hunger | -1.0 (1.3) | -0.4 (1.3) [b] | -0.6 (1.1) | -0.7 (1.3) | -0.4 (1.2) [b] | -0.8 (1.3) | -0.6 (1.3) [b] |
| | Experience hunger | -1.1 (1.1) | -0.7 (1.3) [c] | -0.5 (1.2) | -0.7 (1.1) | -0.6 (1.3) [b] | -0.8 (1.1) | -0.7 (1.2) [b] |
| W/H | Food secure | -0.2 (1.0) | 0.3** (1.3) [a] | 0.6 (1.7) [a] | 0.0 (1.1) | 0.3** (1.4) [a] | -0.1 (1.1) | 0.2** (1.3) [a] |
| | At risk of hunger | 0.0 (1.4) | 0.2 (1.3) [a][b] | 0.0 (1.1) [b] | -0.1 (1.3) | 0.2 (1.3) [a][b] | 0.0 (1.3) | 0.047 (1.3) [a][b] |
| | Experience hunger | -0.4 (1.1) | 0.0 (1.3) [b] | 0.1 (1.1) [a][b] | 0.0 (1.2) | 0.0 (1.2) [b] | -0.1 (1.2) | -0.036 (1.2) [b] |

H/A = Height-for-Age; W/A = Weight-for-Age; W/H = Weight-for-Height

*Kruskal-Wallis test for three samples; significant for $P < 0.05$; **Kruskal-Wallis test for three samples, significant for $P < 0.01$

[a]; [b] and [c]: different symbols indicate which means (comparing the three risk groups) are significantly different, Bonferroni multiple comparison test, $p < 0.05$

Table 8.5 Hunger risk classification as related to anthropometric status in children aged 1 – 9 years by age group: South Africa 1999

| Hunger risk classification | | Age group [Mean (sd)] | | | |
|---|--------------------------|-------------------------|------------------------|------------------------|--------------------------|
| | | Age 1 - 3 years | Age 4 - 6 years | Age 7 - 9 years | RSA |
| Total n [food secure (n); risk of hunger (n); experience (n)] | | 1139 (278; 251; 610) | 922 (229; 202; 491) | 409 (107; 107; 195) | 2735 (683; 625; 1427) |
| H/A | Food secure | -0.7** (1.6) [a] | -0.6** (1.4) [a] | -0.4** (1.2) [a] | -0.6** (1.5) [a] |
| | At risk of hunger | -1.0 (1.6) [b] | -1.0 (1.6) [b] | -0.9 (1.0) [b] | -1.0 (1.5) [b] |
| | Experience hunger | -1.2 (1.6) [b] | -1.0 (1.4) [b] | -0.9 (1.3) [b] | -1.1 (1.5) [b] |
| W/A | Food secure | -0.4** (1.3) [a] | -0.2** (1.4) [a] | -0.1** (1.3) [a] | -0.2** (1.3) [a] |
| | At risk of hunger | -0.6 (1.5) [a][b] | -0.5 (1.2) [b] | -0.7 (0.9) [b] | -0.6 (1.3) [b] |
| | Experience hunger | -0.7 (1.3) [b] | -0.7 (1.1) [b] | -0.8 (1.0) [b] | -0.7 (1.2) [b] |
| W/H | Food secure | 0.2 (1.3) | 0.2* (1.3) [a] | 0.2* (1.4) [a] | 0.2** (1.3) [a] |
| | At risk of hunger | 0.1 (1.4) | 0.1 (1.3) [a][b] | -0.1 (1.1) [a][b] | 0.047 (1.3) [a][b] |
| | Experience hunger | 0.0 (1.2) | -0.1 (1.2) [b] | -0.2 (1.2) [a] | -0.036 (1.2) [b] |

H/A = Height-for-Age; W/A = Weight-for-Age; W/H = Weight-for-Height

*Kruskal-Wallis test for three samples; significant for $P < 0.05$; **Kruskal-Wallis test for three samples, significant for $P < 0.01$

[a]; [b] and [c]: different symbols indicate which means (comparing the three risk groups) are significantly different, Bonferroni multiple comparison test, $p < 0.05$

Table 8.6 Hunger risk classification as related to anthropometric status in children aged 1 – 9 years by province: South Africa 1999

| Hunger risk classification | | Province [Mean (sd)] | | | | | | | | | |
|---|--------------------------|----------------------|--------------------|----------------------|----------------------|---------------------|---------------------|--------------------|----------------------|----------------------|-----------------------------|
| | | EC | FS | G/TENG | KZN | M/GA | NC | NP | NW | WC | RSA |
| Total n [food secure (n); risk of hunger (n); experience (n)] | | 355 (16;41;298) | 203 (94; 33;76) | 391 (146; 83;162) | 442 (111;115;216) | 129 (28; 35; 66) | 124 (11; 31; 82) | 295 (55;80;160) | 221 (29;55;137) | 310 (124; 87; 99) | 2735 (683; 625; 1427) |
| H/A | Food secure | -0.5 (1.5) | -1.1 (1.3) | -0.6* (1.6) | -0.5* (1.4) | -0.6 (1.5) | -0.8 (1.3) | -0.9 (1.6) | -0.8 (1.5) | -0.1** (1.2) [a] | -0.6** (1.5) [a] |
| | At risk of hunger | -0.9 (1.4) | -1.6 (1.6) | -0.7 (1.3) | -0.7 (1.6) | -0.6 (1.8) | -1.3 (1.8) | -1.2 (1.5) | -1.3 (1.4) | -0.9 (1.4) [b] | -1.0 (1.5) [b] |
| | Experience hunger | -1.0 (1.5) | -1.5 (1.5) | -1.0 (1.5) | -0.9 (1.5) | -1.2 (1.8) | -1.2 (1.7) | -1.0 (1.3) | -1.2 (1.3) | -0.9 (1.2) [b] | -1.1 (1.5) [b] |
| W/A | Food secure | 0.1 (1.2) | -0.7 (1.2) | -0.1* (1.4) [a] | -0.1** (1.2) [a] | -0.1 (1.3) | -1.0 (1.8) | -0.7 (1.1) | -1.1 (1.3) | 0.2** (1.3) [a] | -0.2** (1.3) [a] |
| | At risk of hunger | -0.4 (1.2) | -1.0 (1.4) | -0.4 (1.2) [a][b] | -0.3 (1.2) [a][b] | -0.3 (1.5) | -0.8 (1.6) | -0.9 (1.1) | -1.0 (1.1) | -0.6 (1.3) [b] | -0.6 (1.3) [b] |
| | Experience hunger | -0.4 (1.2) | -0.9 (1.1) | -0.6 (1.2)[b] | -0.6 (1.1) [b] | -0.2 (1.4) | -1.2 (1.2) | -1.0 (1.0) | -1.1 (1.0) | -0.8 (1.2) [b] | -0.7 (1.2) [b] |
| W/H | Food secure | 0.7 (1.0) | 0.0 (1.3) | 0.4 (1.4) | 0.3* (1.2) | 0.5 (1.5) | -0.5 (1.4) | -0.1 (1.2) | -0.9 (1.2) [b] | 0.4** (1.2) [a] | 0.2** (1.3) [a] |
| | At risk of hunger | 0.2 (0.9) | 0.1 (1.2) | 0.1 (1.2) | 0.3 (1.4) | 0.2 (1.8) | 0.0 (1.8) | -0.2 (1.3) | -0.3 (0.9)[a] | 0.0 (1.2) [b] | 0.047 (1.3) [a][b] |
| | Experience hunger | 0.3 (1.2) | 0.0 (1.3) | 0.1 (1.1) | 0.0 (1.2) | 0.7 (1.3) | -0.5 (1.2) | -0.5 (1.2) | -0.5 (0.9) [a][b] | -0.2 (1.1) [b] | -0.036 (1.2) [b] |

H/A = Height-for-Age; W/A = Weight-for-Age; W/H = Weight-for-Height; *Kruskal-Wallis test for three samples; significant for $P < 0.05$; **Kruskal-Wallis test for three samples, significant for $P < 0.01$; [a]; [b] and [c]: different symbols indicate which means (comparing the three risk groups) are significantly different, Bonferroni multiple comparison test, $p < 0.05$

Table 8.7 Hunger risk classification as related to the intake of energy and selected micronutrients in children aged 1 – 9 years nationally and by area of residence: South Africa 1999

| Hunger risk classification | | Area of Residence [Mean (sd)] | | | | | | |
|---|--------------------------|-------------------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|------------------------|
| | | Com/rcial Farms | Formal Urban | Informal Urban | Tribal | Urban | Rural | RSA |
| Total n [food secure (n); risk of hunger (n); experience (n)] | | 295 (69; 86;140) | 1046 (425;235;386) | 285 (59; 53;173) | 1081 (123;243;715) | 1331 (484;288;559) | 1376 (192;329;855) | 2707 (676;617;1414) |
| Energy (kJ) | Food secure | 4543** (2318) [a] | 5681** (2493) [a] | 5058** (2146) [a] | 4835** (2155) | 5605** (2460) [a] | 4730** (2213) [a] | 5356** (2423) [a] |
| | At risk of hunger | 4770 (2078) [a][b] | 5295 (2175) [a] | 5335 (1872) [a][b] | 5084 (2264) | 5302 (2119) [a] | 5002 (2218) [a][b] | 5142 (2176) [a] |
| | Experience hunger | 3841 (1817) [b] | 4632 (2294) [b] | 4357 (1939) [b] | 4577 (2219) | 4548 (2193) [b] | 4456 (2174) [b] | 4492 (2181) [b] |
| Vit.C (mg) | Food secure | 46.3 (102) [a] | 54.0** (80.0) [a] | 51.6 (199) | 24.6 (39.5) | 53.7** (101) [a] | 32.4 (69.6) | 47.6** (94.0) [a] |
| | At risk of hunger | 28.8 (39.6) [a][b] | 36.7 (82.5) [b] | 34.2 (56.2) | 42.5 (347) | 36.3 (78.2) [b] | 38.9 (298) | 37.7 (224) [a][b] |
| | Experience hunger | 22.1 (36.8) [b] | 31.0 (74.5) [b] | 28.8 (48.0) | 24.5 (72.7) | 30.3 (67.4) [b] | 24.1 (68.1) | 26.6 (67.9) [b] |
| Vit.A (RE) | Food secure | 296** (482) | 629** (1203) | 266* (262) | 266 (390) | 584** (1138) | 277* (425) | 497** (998) [a] |
| | At risk of hunger | 366 (676) | 503 (1396) | 381 (585) | 356 (1551) | 481 (1286) | 359 (1376) | 415 (1335) [a][b] |
| | Experience hunger | 253 (652) | 532 (1398) | 337 (832) | 288 (484) | 471 (1352) | 282 (515) | 357 (888) [b] |

*Kruskal-Wallis test for three samples; significant for $P < 0.05$; **Kruskal-Wallis test for three samples, significant for $P < 0.01$; [a]; [b] and [c]: different symbols indicate which means (comparing the three risk groups) are significantly different, Bonferroni multiple comparison test, $p < 0.05$

Table 8.8 Hunger risk classification as related to the intake of selected micronutrients in children aged 1 – 9 years nationally and by area of residence: South Africa 1999

| Hunger risk classification | | Area of Residence [Mean (sd)] | | | | | | |
|---|--------------------------|-------------------------------|-----------------------|---------------------|-----------------------|-----------------------|-----------------------|------------------------|
| | | Com/rcial Farms | Formal Urban | Informal Urban | Tribal | Urban | Rural | RSA |
| Total n [food secure (n); risk of hunger (n); experience (n)] | | 295 (69; 86;140) | 1046 (425;235;386) | 285 (59; 53;173) | 1081 (123;243;715) | 1331 (484;288;559) | 1376 (192;329;855) | 2707 (676;617;1414) |
| Iron (mg) | Food secure | 4.5* (2.9) | 7.3** (3.9) [a] | 5.3** (2.8) | 5.8 (3.5) | 7.0** (3.9) [a] | 5.4 (3.4) | 6.5** (3.8) [a] |
| | At risk of hunger | 4.6 (2.6) | 6.2 (4.2) [b] | 5.4 (2.7) | 5.2 (3.8) | 6.0 (4.0) [b] | 5.8 (5.4) | 5.9 (4.8) [b] |
| | Experience hunger | 3.9 (2.8) | 4.8 (3.7) [c] | 4.7 (4.6) | 5.8 (4.8) | 4.8 (4.0) [c] | 5.5 (4.6) | 5.2 (4.4) [c] |
| Zinc (mg) | Food secure | 4.6** (2.9) | 6.2** (3.5) [a] | 5.3** (3.2) | 5.1** (3.0) [a] | 6.1** (3.5) [a] | 4.9** (2.9) [a] | 5.7** (3.4) [a] |
| | At risk of hunger | 4.7 (2.9) | 5.6 (3.0) [a] | 5.1 (2.8) | 5.2 (3.8) [a] | 5.5 (3.0) [b] | 5.0 (3.5) [a] | 5.3 (3.3) [b] |
| | Experience hunger | 3.7 (2.4) | 4.6 (3.1) [b] | 4.3 (3.0) | 4.1 (2.7) [b] | 4.5 (3.1) [c] | 4.1 (2.6) [b] | 4.2 (2.8) [c] |
| Ca⁺⁺ (mg) | Food secure | 330** (288) [a] | 439** (329) [a] | 336* (378) | 276 (227) | 426** (337) [a] | 296** (251) | 389** (320) [a] |
| | At risk of hunger | 249 (163) [a][b] | 355 (294) [b] | 344 (243) | 321 (334) | 353 (285) [b] | 303 (300) | 326 (294) [b] |
| | Experience hunger | 224 (232) [b] | 267 (236) [c] | 273 (279) | 282 (313) | 269 (250) [c] | 273 (302) | 271 (282) [c] |

Ca⁺⁺Calcium; *Kruskal-Wallis test for three samples; significant for P<0.05; **Kruskal-Wallis test for three samples, significant for P<0.01;[a]; [b] and [c]: different symbols indicate which means (comparing the three risk groups) are significantly different, Bonferroni multiple comparison test, p<0.05

Table 8.9 Hunger risk classification as related to the intake of energy and selected micronutrients in children aged 1 – 9 years nationally and by age group: South Africa 1999

| Hunger risk classification | | Age group [Mean (sd)] | | | |
|---|--------------------------|-----------------------|-----------------------|-----------------------|------------------------|
| | | Age 1 - 3 years | Age 4 - 6 years | Age 7 - 9 years | RSA |
| Total n [food secure (n); risk of hunger (n); experience (n)] | | 1238 (297;279;662) | 1027 (262;221;544) | 442 (117;117;208) | 2707 (676;617;1414) |
| Energy (kJ) | Food secure | 4354** (1888) [a] | 5989** (2485) [a] | 6485** (2534) [a] | 5356** (2423) [a] |
| | At risk of hunger | 4472 (1889) [a] | 5624 (2267) [a] | 5830 (2202) [a][b] | 5142 (2176) [a] |
| | Experience hunger | 3983 (1950) [b] | 4813 (2231) [b] | 5278 (2357) [b] | 4492 (2181) [b] |
| Vit.C (mg) | Food secure | 48.3 (112) [a] | 45.4 (73.0) [a] | 51.0 (85.1) | 47.6** (94.0) [a] |
| | At risk of hunger | 30.9 (71.7) [b] | 26.1 (42.4) [b] | 75.8 (499) | 37.7 (224) [a][b] |
| | Experience hunger | 22.5 (47.4) [b] | 29.8 (80.8) [b] | 31.3 (83.7) | 26.6 (67.9) [b] |
| Vit.A (RE) | Food secure | 418** (861) | 569** (1142) | 536** (971) | 497** (998) [a] |
| | At risk of hunger | 338 (483) | 436 (1573) | 562 (2042) | 415 (1335) [a][b] |
| | Experience hunger | 327 (703) | 366 (1029) | 430 (1006) | 357 (888) [b] |

*Kruskal-Wallis test for three samples; significant for $P < 0.05$; **Kruskal-Wallis test for three samples, significant for $P < 0.01$

[a]; [b] and [c]: different symbols indicate which means (comparing the three risk groups) are significantly different, Bonferroni multiple comparison test, $p < 0.05$

Table 8.10 Hunger risk classification as related to the intake of selected micronutrients in children aged 1 – 9 years nationally and by age group: South Africa 1999

| Hunger risk classification | | Age group [Mean (sd)] | | | |
|---|--------------------------|-----------------------|-----------------------|----------------------|------------------------|
| | | Age 1 - 3 years | Age 4 - 6 years | Age 7 - 9 years | RSA |
| Total n [food secure (n); risk of hunger (n); experience (n)] | | 1238 (297;279;662) | 1027 (262;221;544) | 442 (117;117;208) | 2707 (676;617;1414) |
| Iron (mg) | Food secure | 5.3 (3.1) [a] | 7.3 (4.0) [a] | 7.9 (4.2) [a] | 6.5** (3.8) [a] |
| | At risk of hunger | 4.8 (3.3) [a][b] | 6.7 (4.9) [a] | 7.0 (6.6) [a][b] | 5.9 (4.8) [b] |
| | Experience hunger | 4.5 (4.1) [b] | 5.8 (4.4) [b] | 6.2 (4.9) [b] | 5.2 (4.4) [c] |
| Zinc (mg) | Food secure | 4.7** (2.5) [a] | 6.3** (3.5) [a] | 6.9** (4.1) [a] | 5.7** (3.4) [a] |
| | At risk of hunger | 4.5 (2.7) [a] | 6.0 (3.3) [a] | 5.8 (4.0) [b] | 5.3 (3.3) [b] |
| | Experience hunger | 3.8 (2.5) [b] | 4.5 (2.9) [b] | 5.0 (3.4) [b] | 4.2 (2.8) [c] |
| Ca⁺⁺ (mg) | Food secure | 375 (349) [a] | 393 (297) [a] | 416 (292) [a] | 389** (320) [a] |
| | At risk of hunger | 340 (312) [a][b] | 336 (288) [b] | 273 (255) [b] | 326 (294) [b] |
| | Experience hunger | 287 (315) [b] | 249 (236) [c] | 278 (281) [b] | 271 (282) [c] |

Ca⁺⁺ = Calcium

*Kruskal-Wallis test for three samples; significant for P<0.05; **Kruskal-Wallis test for three samples, significant for P<0.01

[a]; [b] and [c]: different symbols indicate which means (comparing the three risk groups) are significantly different, Bonferroni multiple comparison test, p<0.05

Table 8.11 Hunger risk classification as related to the intake of energy and selected micronutrients in children aged 1 – 9 years nationally and by province: South Africa 1999

| Hunger risk classification | | Province [Mean (sd)] | | | | | | | | | |
|---|--------------------------|-----------------------|------------------------|----------------------|----------------------|-----------------------|---------------------|-----------------------|-----------------------|----------------------|------------------------|
| | | EC | FS | G/TENG | KZN | M/GA | NC | NP | NW | WC | RSA |
| Total n [food secure (n); risk of hunger (n); experience (n)] | | 392 (17;47;328) | 206 (93;35;78) | 407 (150;87;170) | 524 (140;136;248) | 148 (31;39;78) | 140 (19;32;89) | 326 (62;86;178) | 222 (28;56;138) | 342 (136;99;107) | 2707 (676;617;1414) |
| Energy (kJ) | Food secure | 6821** (3019) [a] | 4115** (1915)[a][b] | 4711** (1954) [a] | 5672 (2054) | 5264** (1762) [a] | 4217 (3086) | 4999* (2680) [a] | 5529* (3274) [a] | 6716** (2422) [a] | 5356** (2423) [a] |
| | At risk of hunger | 5511 (2082) [a][b] | 4670 (2019) [a] | 4534 (1780) [a] | 5646 (2138) | 4870 (2436) [a][b] | 4310 (2004) | 4401 (2054) [a][b] | 5152 (2518) [a][b] | 5992 (2024) [b] | 5142 (2176) [a] |
| | Experience hunger | 4974 (2363) [b] | 3363 (2217) [b] | 3790 (1351) [b] | 5331 (2266) | 3930 (1917) [b] | 3649 (2151) | 4000 (1820) [b] | 4336 (2055) [b] | 5144 (2113) [c] | 4492 (2181) [b] |
| Vit.C (mg) | Food secure | 41.4** (32.8) [a] | 22.9 (47.0) | 50.9** (86.1) [a] | 52.4 (141) | 35.5 (80.1) | 45.2 (118) | 31.0** (40.9) [a] | 29.5 (71.7) | 71.1** (86.3) [a] | 47.6** (94.0) [a] |
| | At risk of hunger | 23.6 (49.1) [a][b] | 13.9 (18.6) | 25.5 (42.1) [b] | 75.9 (471) | 21.3 (43.4) | 21.2 (33.0) | 15.3 (26.0) [b] | 30.4 (38.9) | 46.3 (48.2) [b] | 37.7 (224) [a][b] |
| | Experience hunger | 20.3 (30.9) [b] | 17.3 (24.5) | 21.1 (36.0) [b] | 40.7 (107) | 21.9 (62.7) | 29.1 (96.4) | 14.7 (35.1) [b] | 36.9 (102) | 36.5 (45.2) [b] | 26.6 (67.9) [b] |
| Vit.A (RE) | Food secure | 794** (1186) [a] | 466* (1161) | 507** (1054) | 295** (282) | 229 (252) | 781* (1681) [a] | 529 (1230) | 377* (723) | 710** (1131) | 497** (998) [a] |
| | At risk of hunger | 229 (237) [b] | 205 (197) | 243 (330) | 436 (1873) | 943 (3397) | 196 [b] (199) | 384 (805) | 247 (508) | 687 (871) | 415 (1335) [a][b] |
| | Experience hunger | 310 (752) [b] | 233 (541) | 462 (1612) | 311 (525) | 285 (755) | 278 (778) [a][b] | 490 (623) | 321 (930) | 473 (990) | 357 (888) [b] |

*Kruskal-Wallis test for three samples; significant for $P < 0.05$; **Kruskal-Wallis test for three samples, significant for $P < 0.01$; [a]; [b] and [c]: different symbols indicate which means (comparing the three risk groups) are significantly different, Bonferroni multiple comparison test, $p < 0.05$

Table 8.12 Hunger risk classification as related to the intake of selected micronutrients in children aged 1 – 9 years nationally and by province: South Africa 1999

| Hunger risk classification | | Province [Mean (sd)] | | | | | | | | | |
|---|--------------------------|----------------------|---------------------|---------------------|-----------------------|---------------------|-------------------|---------------------|--------------------|---------------------|------------------------|
| | | EC | FS | G/TENG | KZN | M/GA | NC | NP | NW | WC | RSA |
| Total n [food secure (n); risk of hunger (n); experience (n)] | | 392 (17;47;328) | 206 (93;35;78) | 407 (150;87;170) | 524 (140;136;248) | 148 (31;39;78) | 140 (19;32;89) | 326 (62;86;178) | 222 (28;56;138) | 342 (136;99;107) | 2707 (676;617;1414) |
| Iron (mg) | Food secure | 8.4** (3.9) [a] | 4.5** (3.4) [a] | 6.0** (3.3) [a] | 6.6* (3.6) | 6.3 (4.0) | 4.2 (3.2) | 7.3 (4.4) | 6.0** (3.4) | 8.4** (3.7) [a] | 6.5** (3.8) [a] |
| | At risk of hunger | 5.1 (3.1) [b] | 4.0 (2.8) [a][b] | 5.0 (2.7) [a][b] | 5.8 (4.0) | 5.1 (3.5) | 4.3 (2.6) | 8.7 (9.1) | 5.5 (3.5) | 6.7 (3.4) [b] | 5.9 (4.8) [b] |
| | Experience hunger | 4.5 (3.1) [b] | 3.1 (2.6) [b] | 4.4 (4.2) [b] | 6.1 (4.4) | 5.1 (3.4) | 3.5 (3.0) | 8.5 (6.7) | 4.4 (3.5) | 5.4 (3.3) [c] | 5.2 (4.4) [c] |
| Zinc (mg) | Food secure | 7.7** (3.7) [a] | 4.2** (2.6) [a] | 4.8** (2.7) [a] | 5.9** (2.6) [a] | 5.2** (2.2) [a] | 4.9 (4.1) | 6.0** (4.0) [a] | 5.0* (2.8) | 7.5** (4.1) [a] | 5.7** (3.4) [a] |
| | At risk of hunger | 4.5 (2.5) [b] | 4.0 (2.5) [a][b] | 4.7 (2.5) [a] | 5.6 (2.8) [a][b] | 4.9 (3.1) [a][b] | 4.4 (3.4) | 5.9 (4.9) [a][b] | 5.2 (3.2) | 6.2 (3.1) [b] | 5.3 (3.3) [b] |
| | Experience hunger | 4.0 (2.4) [b] | 3.1 (2.3) [b] | 3.9 (2.1) [b] | 5.0 (3.3) [b] | 3.8 (2.0) [b] | 3.9 (3.5) | 4.4 (3.0) [b] | 4.1 (2.8) | 5.1 (3.1) [b] | 4.2 (2.8) [c] |
| Ca⁺⁺ (mg) | Food secure | 534** (211) [a] | 313** (230) | 338** (277) [a] | 392** (348) [a][b] | 258 (212) | 221 (171) | 247 (220) | 255 (154) | 622** (368) [a] | 389** (320) [a] |
| | At risk of hunger | 343 (317) [a][b] | 292 (244) | 250 (174) [b] | 416 (345) [a] | 265 (266) | 222 (177) | 267 (328) | 268 (219) | 413 (307) [b] | 326 (294) [b] |
| | Experience hunger | 319 (373) [b] | 212 (237) | 237 (208) [b] | 314 (326) [b] | 193 (148) | 175 (179) | 269 (235) | 228 (196) | 317 (243) [b] | 271 (282) [c] |

Ca⁺⁺= Calcium; *Kruskal-Wallis test for three samples; significant for P<0.05; **Kruskal-Wallis test for three samples, significant for P<0.01; [a]; [b] and [c]: different symbols indicate which means (comparing the three risk groups) are significantly different, Bonferroni multiple comparison test, p<0.05

Table 8.13 Hunger risk classification as related to food procurement in children aged 1 – 9 years nationally and by area of residence: South Africa 1999

| Hunger risk classification | | Area of Residence [Mean (sd)] | | | | | | |
|---|--------------------------|-------------------------------|-----------------------|--------------------|-----------------------|-----------------------|-----------------------|------------------------|
| | | Com/rcial Farms | Formal Urban | Informal Urban | Tribal | Urban | Rural | RSA |
| Total n [food secure (n); risk of hunger (n); experience (n)] | | 289 (68;84;137) | 1017 (416;227;374) | 274 (57;50;167) | 1077 (119;245;714) | 1291 (473;277;541) | 1366 (186;329;851) | 2657 (659;606;1392) |
| Items in proc. | Food secure | 34.1 (24.0) | 53.9** (28.3) [a] | 34.6 (15.2) | 29.0* (15.8) [a] | 51.6** (27.8) [a] | 30.8** (19.3) [a] | 45.8** (27.3) [a] |
| | At risk of hunger | 34.1 (17.3) | 46.6 (22.3) [b] | 36.6 (16.4) | 28.0 (12.7) [a][b] | 44.8 (21.7) [b] | 29.5 (14.2) [a] | 36.5 (19.6) [b] |
| | Experience hunger | 29.2 (17.5) | 34.5 (18.2) [c] | 32.4 (14.9) | 25.5 (13.0) [b] | 33.9 (17.2) [c] | 26.1 (13.9) [b] | 29.1 (15.7) [c] |
| Anim. in proc. | Food secure | 7.6 (5.2) | 12.4** (6.8) [a] | 7.9 (3.9) | 6.4** (3.9) [a] | 11.8** (3.7) [a] | 6.8** (4.5) [a] | 10.4** (6.5) [a] |
| | At risk of hunger | 7.4 (4.0) | 10.6 (5.6) [b] | 8.4 (3.9) | 6.1 (3.2) [a] | 10.2 (5.4) [b] | 6.5 (3.4) [a] | 8.2 (4.8) [b] |
| | Experience hunger | 6.5 (4.1) | 7.7 (4.6) [c] | 7.3 (3.7) | 5.3 (3.2) [b] | 7.6 (4.3) [c] | 5.5 (3.4) [b] | 6.3 (3.9) [c] |
| Dairy in proc. | Food secure | 2.1** (1.8) [a] | 3.5** (2.3) [a] | 2.2* (1.4) | 1.7** (1.4) [a] | 3.4** (2.3) [a] | 1.8** (1.6) [a] | 2.9** (2.2) [a] |
| | At risk of hunger | 1.7 (1.1) [a][b] | 2.8 (1.9) [b] | 2.3 (1.5) | 1.5 (1.1) [a][b] | 2.7 (1.8) [b] | 1.6 (1.1) [b] | 2.1 (1.6) [b] |
| | Experience hunger | 1.3 (1.1) [b] | 1.9 (1.4) [c] | 1.8 (1.4) | 1.3 (1.0) [b] | 1.8 (1.4) [c] | 1.3 (1.0) [c] | 1.5 (1.2) [c] |

*Kruskal-Wallis test for three samples; significant for $P < 0.05$; **Kruskal-Wallis test for three samples, significant for $P < 0.01$

[a]; [b] and [c]: different symbols indicate which means (comparing the three risk groups) are significantly different, Bonferroni multiple comparison test, $p < 0.05$

Proc. = Procurement; Anim. = Foods of animal origin; Dairy = Dairy products

Table 8.14 Hunger risk classification as related to procurement in children aged 1 – 9 years by age group: South Africa 1999

| Hunger risk classification | | Age group [Mean (sd)] | | | |
|---|--------------------------|-------------------------|-------------------------|------------------------|------------------------|
| | | Age 1 - 3 years | Age 4 - 6 years | Age 7 - 9 years | RSA |
| Total n [food secure (n); risk of hunger (n); experience (n)] | | 1213 (289; 275; 649) | 1006 (257; 214; 535) | 438 (113; 117; 208) | 2657 (659;606;1392) |
| Items in proc | Food secure | 42.9** (26.0) [a] | 46.9** (28.6) [a] | 50.5** (26.9) [a] | 45.8** (27.3) [a] |
| | At risk of hunger | 35.8 (20.0) [b] | 37.3 (18.9) [b] | 37.0 (19.9) [b] | 36.5 (19.6) [b] |
| | Experience hunger | 28.8 (16.2) [c] | 29.2 (15.1) [c] | 29.9 (15.7) [c] | 29.1 (15.7) [c] |
| Anim. in proc. | Food secure | 9.7** (6.0) [a] | 10.7** (7.0) [a] | 11.5** (6.4) [a] | 10.4** (6.5) [a] |
| | At risk of hunger | 8.1 (4.9) [b] | 8.3 (4.7) [b] | 8.2 (4.6) [b] | 8.2 (4.8) [b] |
| | Experience hunger | 6.2 (4.0) [c] | 6.3 (3.8) [c] | 6.5 (3.9) [c] | 6.3 (3.9) [c] |
| Dairy in proc. | Food secure | 2.8** (2.0) [a] | 3.0** (2.4) [a] | 3.2** (2.2) [a] | 2.9** (2.2) [a] |
| | At risk of hunger | 2.1 (1.6) [b] | 2.0 (1.6) [b] | 1.9 (1.6) [b] | 2.1 (1.6) [b] |
| | Experience hunger | 1.5 (1.2) [c] | 1.5 (1.2) [c] | 1.5 (1.2) [b] | 1.5 (1.2) [c] |

*Kruskal-Wallis test for three samples; significant for P<0.05; **Kruskal-Wallis test for three samples, significant for P<0.01

[a]; [b] and [c]: different symbols indicate which means (comparing the three risk groups) are significantly different, Bonferroni multiple comparison test, p<0.05; Proc. = Procurement; Anim. = Foods of animal origin; Dairy = Dairy products

Table 8.15 Hunger risk classification as related to procurement in children aged 1 – 9 years by province: South Africa 1999

| Hunger risk classification | | Province [Mean (sd)] | | | | | | | | | |
|--|--------------------------|----------------------|----------------------|----------------------|----------------------|----------------------|---------------------|----------------------|----------------------|----------------------|-------------------------|
| | | EC | FS | G/TENG | KZN | M/GA | NC | NP | NW | WC | RSA |
| Total n [food secure (n); risk of hunger (n); experience (n)] | | 395 (16;50;329) | 206 (94;34;78) | 352 (134;71;147) | 521 (138;137;246) | 147 (30; 39; 78) | 144 (19; 34;91) | 330 (63;87;180) | 220 (29;55;136) | 342 (136;99;107) | 2657 (659;606; 1392) |
| Items in proc. | Food secure | 17.3* (23.9) [a] | 17.8** (8.9) [a] | 50.1** (23.9) [a] | 44.3** (18.9) [a] | 39.9** (21.0) [a] | 24.1** (9.4) [a] | 23.1** (14.9) [a] | 40.7** (12.7) [a] | 78.0** (20.3) [a] | 45.8** (27.3) [a] |
| | At risk of hunger | 36.6 (11.6) [b] | 14.4 (5.5) [a][b] | 35.7 (16.1) [b] | 38.3 (12.4) [b] | 27.3 (15.4) [b] | 31.0 (10.8) [b] | 19.1 (11.0) [a] | 36.9 (11.3) [a] | 63.0 (19.6) [b] | 36.5 (19.6) [b] |
| | Experience hunger | 34.0 (10.8) [b] | 13.6 (6.3) [b] | 30.6 (12.8) [b] | 32.6 (13.0) [c] | 16.9 (10.3) [c] | 19.9 (10.3) [b] | 14.4 (10.1) [b] | 30.4 (8.2) [b] | 55.5 (16.8) [c] | 29.1 (15.7) [c] |
| Anim. in proc. | Food secure | 11.3** (6.0) [a] | 3.8** (2.3) [a] | 12.0** (5.9) [a] | 9.6** (4.7) [a] | 9.0** (5.2) [a] | 4.5** (2.4) [a] | 5.8** (4.2) [a] | 9.6** (3.5) [a] | 17.7** (4.8) [a] | 10.4** (6.5) [a] |
| | At risk of hunger | 8.2 (3.6) [b] | 3.1 (1.4) [a][b] | 8.6 (4.2) [b] | 8.1 (3.1) [b] | 6.2 (3.4) [b] | 6.6 (3.0) [b] | 4.7 (3.4) [a] | 8.1 (2.8) [b] | 14.2 (5.3) [b] | 8.2 (4.8) [b] |
| | Experience hunger | 7.4 (3.2) [b] | 2.7 (1.6) [b] | 7.2 (3.4) [b] | 6.5 (3.2) [c] | 3.9 (2.8) [c] | 4.4 (1.0) [b] | 3.2 (2.8) [b] | 6.5 (2.3) [c] | 12.4 (4.4) [c] | 6.3 (3.9) [c] |
| Dairy in proc. | Food secure | 3.3** (1.8) [a] | 1.0** (0.5) [a] | 3.1** (2.0) [a] | 3.1** (1.8) [a] | 2.2** (1.8) [a] | 0.8 (0.6) | 1.7** (1.6) [a] | 2.2** (1.2) [a] | 5.1** (2.1) [a] | 2.9** (2.2) [a] |
| | At risk of hunger | 2.5 (1.5) [b] | 1.0 (0.3) [a][b] | 2.2 (1.4) [b] | 2.4 (1.2) [b] | 1.4 (1.1) [b] | 1.1 (1.0) | 0.9 (1.0) [b] | 1.6 (1.0) [b] | 3.6 (1.9) [b] | 2.1 (1.6) [b] |
| | Experience hunger | 2.1 (1.2) [b] | 0.8 (0.5) [a] | 1.4 (1.1) [c] | 1.6 (1.1) [c] | 0.8 (0.8) [b] | 0.8 (0.7) | 0.6 (0.7) [b] | 1.3 (0.7) [b] | 3.1 (1.6) [b] | 1.5 (1.2) [c] |

*Kruskal-Wallis test for three samples; significant for $P < 0.05$; **Kruskal-Wallis test for three samples, significant for $P < 0.01$; [a]; [b] and [c]: different symbols indicate which means (comparing the three risk groups) are significantly different, Bonferroni multiple comparison test; $p < 0.05$; Proc. = Procurement; Anim. = Foods of animal origin; Dairy = Dairy products

Table 8.16 Hunger risk classification as related to the HH inventory in children aged 1 – 9 years nationally and by area of residence: South Africa 1999

| Hunger risk classification | | Area of Residence [Mean (sd)] | | | | | | |
|---|--------------------------|-------------------------------|-----------------------|---------------------|-----------------------|----------------------|-----------------------|-----------------------|
| | | Com/rcial Farms | Formal Urban | Informal Urban | Tribal | Urban | Rural | RSA |
| Total n [food secure (n); risk of hunger (n); experience (n)] | | 182 (53; 52; 77) | 413 (122; 79; 212) | 138 (31; 24; 83) | 913 (97; 208; 608) | 551 (153;103;295) | 1095 (150;260;685) | 1646 (303;363;980) |
| Items in inv. | Food secure | 9.6 (7.4) | 13.8** (13.8) [a] | 10.2 (7.3) | 12.3** (8.9) [a] | 13.1** (12.8) [a] | 11.3** (8.5) [a] | 12.2** (10.9) [a] |
| | At risk of hunger | 10.4 (7.8) | 12.1 (9.0) [a][b] | 8.5 (6.1) | 9.3 (5.8) [b] | 11.3 (8.5) [a] | 9.5 (6.3) [b] | 10.0 (7.0) [b] |
| | Experience hunger | 8.0 (6.0) | 9.1 (7.4) [b] | 8.0 (6.0) | 6.5 (4.6) [c] | 8.8 (7.1) [b] | 6.7 (4.8) [c] | 7.3 (5.7) [c] |
| Anim. in inv. | Food secure | 1.3 (1.7) | 2.9** (3.7) [a] | 1.4 (1.8) | 2.1** (2.3) [a] | 2.6** (3.4) [a] | 1.8** (2.1) [a] | 2.2** (2.9) [a] |
| | At risk of hunger | 1.5 (1.8) | 2.2 (2.6) [a] | 1.3 (1.8) | 1.3 (1.6) [b] | 2.0 (2.4) [a] | 1.3 (1.7) [b] | 1.5 (1.9) [b] |
| | Experience hunger | 0.9 (1.4) | 1.2 (1.6) [b] | 0.8 (1.1) | 0.6 (1.0) [c] | 1.1 (1.5) [b] | 0.6 (1.1) [c] | 0.8 (1.2) [c] |
| Dairy in inv. | Food secure | 0.4 (0.6) | 1.0** (1.3) [a] | 0.6* (0.8) | 0.7** (0.9) [a] | 0.9** (1.2) [a] | 0.6** (0.8) [a] | 0.8** (1.1) [a] |
| | At risk of hunger | 0.5 (0.6) | 0.8 (1.2) [a] | 0.7 (1.0) | 0.5 (0.7) [b] | 0.8 (1.1) [a] | 0.5 (0.7) [a] | 0.6 (0.9) [b] |
| | Experience hunger | 0.4 (0.6) | 0.3 (0.6) [b] | 0.3 (0.5) | 0.3 (0.5) [c] | 0.3 (0.6) [b] | 0.3 (0.5) [b] | 0.3 (0.5) [c] |

*Kruskal-Wallis test for three samples; significant for $P < 0.05$; **Kruskal-Wallis test for three samples, significant for $P < 0.01$

[a]; [b] and [c]: different symbols indicate which means (comparing the three risk groups) are significantly different, Bonferroni multiple comparison test, $p < 0.05$; Inv. = Inventory; Anim. = Foods of animal origin; Dairy = Dairy products

Table 8.17 Hunger risk classification as related to the HH inventory in children aged 1 – 9 years nationally and by age: South Africa 1999

| Hunger risk classification | | Age group [Mean (sd)] | | | |
|---|--------------------------|-------------------------|------------------------|----------------------|-----------------------|
| | | Age 1 - 3 years | Age 4 - 6 years | Age 7 - 9 years | RSA |
| Total n [food secure (n); risk of hunger (n); experience (n)] | | 1631 (126; 162; 428) | 654 (128; 132; 394) | 276 (49; 69; 158) | 1646 (303;363;980) |
| Items in inv. | Food secure | 11.3** (10.8) [a] | 12.7** (10.7) [a] | 13.2** (12.0) [a] | 12.2** (10.9) [a] |
| | At risk of hunger | 9.4 (5.9) [b] | 11.4 (8.5) [a] | 8.8 (5.9) [b] | 10.0 (7.0) [b] |
| | Experience hunger | 7.3 (5.4) [c] | 7.1 (5.7) [b] | 7.9 (6.1) [b] | 7.3 (5.7) [c] |
| Anim. in inv. | Food secure | 1.9** (2.5) [a] | 2.2** (3.0) [a] | 2.8** (3.4) [a] | 2.2** (2.9) [a] |
| | At risk of hunger | 1.3 (1.6) [b] | 1.9 (2.4) [a] | 1.1 (1.6) [b] | 1.5 (1.9) [b] |
| | Experience hunger | 0.7 (1.2) [c] | 0.7 (1.3) [b] | 0.8 (1.3) [b] | 0.8 (1.2) [c] |
| Dairy in inv. | Food secure | 0.7** (0.9) [a] | 0.8** (1.2) [a] | 0.9** (1.1) [a] | 0.8** (1.1) [a] |
| | At risk of hunger | 0.6 (0.8) [a] | 0.7 (1.0) [a] | 0.4 (0.7) [b] | 0.6 (0.9) [b] |
| | Experience hunger | 0.3 (0.5) [b] | 0.3 (0.5) [b] | 0.3 (0.6) [b] | 0.3 (0.5) [c] |

*Kruskal-Wallis test for three samples; significant for $P < 0.05$; **Kruskal-Wallis test for three samples, significant for $P < 0.01$

[a]; [b] and [c]: different symbols indicate which means (comparing the three risk groups) are significantly different, Bonferroni multiple comparison test, $p < 0.05$; Inv. = Inventory; Anim. = Foods of animal origin; Dairy = Dairy products

Table 8.18 Hunger risk classification as related to the HH inventory in children aged 1 – 9 years nationally and by province: South Africa 1999

| Hunger risk classification | | Province [Mean (sd)] | | | | | | | | | |
|---|--------------------------|----------------------|--------------------|-----------------------|---------------------|----------------------|-------------------|---------------------|---------------------|------------------|-----------------------|
| | | EC | FS | G/TENG | KZN | M/GA | NC | NP | NW | WC | RSA |
| Total n [food secure (n); risk of hunger (n); experience (n)] | | 330 (10;35;285) | 178 (84;27;67) | 148 (38;31;79) | 300 (50;82;168) | 135 (25;34;76) | 62 (9; 14; 39) | 318 (61;87;170) | 110 (12;24;74) | 65 (14;29;22) | 1646 (303;363;980) |
| Items in inv. | Food secure | 12.8* (8.5) | 6.4** (6.9) [a] | 10.0* (10.5) | 17.2** (9.3) [a] | 17.1** (14.9) [a] | 10.4* (2.3) | 13.8** (9.8) [a] | 10.0** (7.3) [a] | 21.9 (19.6) | 12.2** (10.9) [a] |
| | At risk of hunger | 11.5 (5.6) | 3.9 (2.4) [b] | 10.6 (6.2) | 10.3 (6.1) [b] | 10.2 (5.8) [b] | 9.1 (4.3) | 9.0 (6.1) [b] | 9.0 (6.3) [a][b] | 16.8 (12.7) | 10.0 (7.0) [b] |
| | Experience hunger | 9.2 (6.8) | 3.2 (2.1) [b] | 7.3 (4.8) | 7.4 (5.2) [c] | 6.4 (5.2) [b] | 6.9 (4.1) | 6.2 (4.3) [c] | 5.6 (4.2) [b] | 13.7 (7.2) | 7.3 (5.7) [c] |
| Anim. in inv. | Food secure | 1.7* (1.8) [a] | 1.0 (2.1) | 1.5** (3.1) [a][b] | 2.7** (2.4) [a] | 4.0** (4.1) [a] | 0.9 (0.8) | 3.3** (2.8) [a] | 1.3* (1.8) | 3.4 (4.0) | 2.2** (2.9) [a] |
| | At risk of hunger | 0.9 (1.2) [a][b] | 0.6 (0.7) | 2.1 (1.9) [a] | 1.4 (1.6) [b] | 2.2 (1.8) [b] | 0.9 (1.4) | 1.5 (1.9) [b] | 1.4 (2.0) | 2.4 (3.6) | 1.5 (1.9) [b] |
| | Experience hunger | 0.7 (1.2) [b] | 0.4 (0.7) | 0.9 (1.1) [b] | 0.6 (1.2) [c] | 1.2 (1.6) [b] | 0.6 (0.8) | 0.9 (1.4) [b] | 0.4 (0.8) | 1.5 (1.6) | 0.8 (1.2) [c] |
| Dairy in inv. | Food secure | 1.0* (1.1) [a] | 0.4 (0.6) | 0.6** (1.1) [a][b] | 0.9** (1.0) [a] | 0.9 (1.2) [a] | 0.4 (0.5) | 1.1** (1.3) [a] | 0.3 (0.7) | 1.1 (1.7) | 0.8** (1.1) [a] |
| | At risk of hunger | 0.5 (0.8) [b] | 0.3 (0.5) | 0.9 (1.0) [a] | 0.7 (0.8) [a] | 0.6 (0.6) [a][b] | 0.3 (0.6) | 0.5 (0.7) [b] | 0.5 (0.9) | 0.8 (1.5) | 0.6 (0.9) [b] |
| | Experience hunger | 0.3 (0.6) [b] | 0.3 (0.5) | 0.2 (0.5) [b] | 0.3 (0.6) [b] | 0.4 (0.6) [b] | 0.3 (0.4) | 0.3 (0.5) [b] | 0.2 (0.4) | 0.5 (0.6) | 0.3 (0.5) [c] |

*Kruskal-Wallis test for three samples; significant for $P < 0.05$; **Kruskal-Wallis test for three samples, significant for $P < 0.01$

[a]; [b] and [c]: different symbols indicate which means (comparing the three risk groups) are significantly different, Bonferroni multiple comparison test, $p < 0.05$; Inv. = Inventory; Anim. = Foods of animal origin; Dairy = Dairy products

Table 8.19 Hunger risk classification as related to the type of dwelling and maternal education in children aged 1 – 9 years nationally and by area of residence: South Africa 1999

| Hunger risk classification | | Area of Residence [Mean (sd)] | | | | | | |
|--|--------------------------|-------------------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|------------------------|
| | | Com/rcial Farms | Formal Urban | Informal Urban | Tribal | Urban | Rural | RSA |
| Total n [food secure (n1); risk of hunger (n2); experience (n3)] | | 292 (69;87;136) | 1050 (426;239;385) | 282 (59; 51; 172) | 1074 (122;242;710) | 1332 (485;290;557) | 1366 (191;329;846) | 2698 (676;619;1403) |
| Type of dwelling ^{\$} | Food secure | 1.2** (0.6) [b] | 1.2** (0.6) [b] | 1.8** (1.0) [b] | 1.3** (0.6) [b] | 1.2** (0.7) [a] | 1.3** (0.6) [b] | 1.3** (0.7) [a] |
| | At risk of hunger | 1.5 (1.0) [b] | 1.3 (0.7) [b][a] | 2.2 (1.3) [a] | 1.5 (0.7) [a] | 1.4 (0.9) [b] | 1.5 (0.8) [a] | 1.5 (0.9) [b] |
| | Experience hunger | 1.9 (1.4) [a] | 1.4 (0.8) [a] | 2.6 (1.0) [a] | 1.6 (0.7) [a] | 1.7 (1.0) [c] | 1.6 (0.9) [a] | 1.7 (0.9) [c] |
| Total n [food secure (n1); risk of hunger (n2); experience (n3)] | | 279 (67;84;128) | 974 (398;217;359) | 254 (49; 48;158) | 964 (111;217;636) | 1228 (447;264;517) | 1243 (178;301;764) | 2471 (625;565;1281) |
| Educ. & Level of mother | Food secure | 2.7* (1.1) [a] | 3.8** (1.0) [a] | 2.9** (1.1) [a][b] | 3.1** (1.1) [a] | 3.7** (1.0) [a] | 3.0** (1.1) [a] | 3.5** (1.1) [a] |
| | At risk of hunger | 2.3 (0.8) [b] | 3.5 (0.9) [b] | 3.2 (1.1) [a] | 2.9 (1.0) [a] | 3.5 (1.0) [b] | 2.7 (1.0) [b] | 3.1 (1.1) [b] |
| | Experience hunger | 2.2 (0.9) [b] | 2.9 (1.1) [c] | 2.6 (0.9) [b] | 2.5 (1.1) [b] | 2.8 (1.0) [c] | 2.4 (1.0) [c] | 2.6 (1.1) [c] |

*Kruskal-Wallis test for three samples; significant for $P < 0.05$; **Kruskal-Wallis test for three samples, significant for $P < 0.01$; [a]; [b] and [c]: different symbols indicate which means (comparing the three risk groups) are significantly different, Bonferroni multiple comparison test, $p < 0.05$; \$Type of dwelling: 1 = rick/concrete; 2 = Traditional mud; 3 = Tin; 4 = Plank/wood; 5 = Other. The mean and standard deviation presented in this table is the mean of categories 1 to 5. A lower mean indicates a more formal dwelling & Educ. = Education level of mother: 1 = None; 2 = Primary school; 3 = Std 6-8; 4 = Std 9-10; 5 = Tertiary. The mean and standard deviation presented in this table is the mean of categories 1 to 5. The higher the mean, the higher the level of education of the mother

Table 8.20 Hunger risk classification as related to the type of dwelling and maternal education in children aged 1 – 9 years nationally and by province: South Africa 1999

| Hunger risk classification | | Province [Mean (sd)] | | | | | | | | | |
|---|--------------------------|----------------------|---------------------|---------------------|----------------------|---------------------|---------------------|---------------------|---------------------|---------------------|------------------------|
| | | EC | FS | G/TENG | KZN | M/GA | NC | NP | NW | WC | RSA |
| Total n [food secure (n); risk of hunger (n); experience (n)] | | 390 (17;50;323) | 209 (95;35;79) | 406 (148;88;170) | 517 (139;135;243) | 145 (31;38;76) | 137 (18;34;85) | 328 (63;84;181) | 226 (30;57;139) | 340 (135;98;107) | 2698 (676;619;1403) |
| Type of dwelling^{\$} | Food secure | 1.5 (1.1) | 1.5** (0.8) [b] | 1.5** (0.9) [b] | 1.2** (0.4) [b] | 1.0 (0.2) | 1.1** (0.5) [b] | 1.1** (0.3) [b] | 1.4 (0.8) | 1.0** (0.3) [b] | 1.3** (0.7) [a] |
| | At risk of hunger | 1.6 (0.8) | 1.7 (1.0) [b][a] | 1.9 (1.0) [a] | 1.5 (0.9) [a] | 1.1 (0.4) | 1.2 (0.8) [b][a] | 1.2 (0.5) [b][a] | 1.5 (0.8) | 1.3 (0.9) [b] | 1.5 (0.9) [b] |
| | Experience hunger | 1.7 (0.8) | 1.9 (0.9) [a] | 2.1 (1.0) [a] | 1.7 (0.9) [a] | 1.2 (0.5) | 1.9 (1.5) [a] | 1.3 (0.5) [a] | 1.4 (0.7) | 1.9 (1.2) [a] | 1.7 (0.9) [c] |
| Total n [food secure (n); risk of hunger (n); experience (n)] | | 351 (16;47;288) | 194 (88;32;74) | 386 (144;83;159) | 410 (110;102;198) | 142 (29;38;75) | 121 (15;30;76) | 316 (61;81;174) | 217 (29;55;133) | 334 (133;97;104) | 2471 (625;565;1281) |
| Educ. & Level of mother | Food secure | 3.6** (1.0) [a] | 2.8* (1.0) | 3.6** (1.0) [a] | 3.4** (1.2) [a] | 3.4* (1.2) [a] | 3.1** (0.9) [a] | 3.7** (1.2) [a] | 3.3* (1.0) [a] | 3.9** (1.0) [a] | 3.5** (1.1) [a] |
| | At risk of hunger | 3.2 (0.9) [a][b] | 1.8 (1.1) | 3.2 (1.1) [b] | 3.0 (1.0) [b] | 3.1 (1.1) [a][b] | 2.7 (1.3) [a][b] | 3.2 (1.1) [b] | 2.9 (1.0) [a][b] | 3.2 (1.0) [b] | 3.1 (1.1) [b] |
| | Experience hunger | 2.7 (1.1) [b] | 2.4 (1.0) | 2.8 (0.9) [c] | 2.5 (1.1) [c] | 2.7 (1.2) [b] | 2.2 (1.0) [b] | 2.6 (1.2) [c] | 2.7 (1.0) [b] | 2.7 (0.9) [c] | 2.6 (1.1) [c] |

*Kruskal-Wallis test for three samples; significant for $P < 0.05$; **Kruskal-Wallis test for three samples, significant for $P < 0.01$

[a]; [b] and [c]: different symbols indicate which means (comparing the three risk groups) are significantly different, Bonferroni multiple comparison test, $p < 0.05$

^{\$}Type of dwelling: 1 = Brick/concrete; 2 = Traditional mud; 3 = Tin; 4 = Plank/wood; 5 = Other. The mean and standard deviation presented in this table is the mean of categories 1 to 5. A lower mean indicates a more formal dwelling

&Educ. = Education level of mother: 1 = None; 2 = Primary school; 3 = Std 6-8; 4 = Std 9-10; 5 = Tertiary. The mean and standard deviation presented in this table is the mean of categories 1 to 5. The higher the mean, the higher the level of education of the mother

Table 8.21 Hunger risk classification as related to HH income and money spent on food in children aged 1 – 9 years nationally and by area of residence: South Africa 1999

| Hunger risk classification | | Area of Residence [Mean (sd)] | | | | | | |
|--|--------------------------|-------------------------------|----------------------|---------------------|----------------------|-----------------------|-----------------------|------------------------|
| | | Com/rcial Farms | Formal Urban | Informal Urban | Tribal | Urban | Rural | RSA |
| Total n [food secure (n1); risk of hunger (n2); experience (n3)] | | 259 (60;76;123) | 932 (374;217;341) | 243 (50; 43;150) | 929 (101;199;629) | 1175 (424;260;491) | 1188 (161;275;752) | 2363 (585;535;1243) |
| Household income^{\$} | Food secure | 3.2 (1.2) | 4.2** (1.3) [a] | 3.3** (0.8) [a] | 3.2** (1.0) [a] | 4.1** (1.3) [a] | 3.2** (1.1) [a] | 3.8** (1.3) [a] |
| | At risk of hunger | 2.9 (0.8) | 3.4 (1.1) [b] | 2.8 (1.1) [b] | 2.8 (1.0) [b] | 3.3 (1.1) [b] | 2.8 (0.9) [b] | 3.1 (1.1) [b] |
| | Experience hunger | 2.8 (0.9) | 2.7 (1.0) [c] | 2.4 (0.9) [b] | 2.4 (0.8) [c] | 2.6 (1.0) [c] | 2.5 (0.8) [c] | 2.5 (0.9) [c] |
| Total n [food secure (n1); risk of hunger (n2); experience (n3)] | | 238 (60;67;111) | 872 (358;202;312) | 233 (51; 41;141) | 825 (81;186;558) | 1105 (409;243;453) | 1063 (141;253;669) | 2168 (550;496;1122) |
| Money spent on food^{&} | Food secure | 3.5** (2.1) [a] | 4.9** (2.5) [a] | 3.2* (1.9) | 2.9** (2.1) | 4.7** (2.5) [a] | 3.2** (2.1) [a] | 4.3** (2.5) [a] |
| | At risk of hunger | 3.1 (2.0) [a][b] | 3.8 (2.4) [b] | 2.9 (1.8) | 2.4 (1.9) | 3.7 (2.3) [b] | 2.6 (2.0) [b] | 3.1 (2.2) [b] |
| | Experience hunger | 2.5 (1.6) [b] | 2.9 (1.9) [c] | 2.6 (1.9) | 2.4 (2.1) | 2.8 (1.9) [c] | 2.4 (2.0) [b] | 2.6 (2.0) [c] |

*Kruskal-Wallis test for three samples; significant for $P < 0.05$; **Kruskal-Wallis test for three samples, significant for $P < 0.01$

[a]; [b] and [c]: different symbols indicate which means (comparing the three risk groups) are significantly different, Bonferroni multiple comparison test, $p < 0.05$

^{\$}Household income (per month): 1 = None; 2 = R100-R500; 3 = R500-R1000; 4 = R1000-R3000; 5 = R3000-R5000; 6 = Over R5000. The mean and standard deviation presented in this table is the mean of categories 1 to 6. The higher the mean, the higher the monthly income

[&]Money spent on food (per week): 1 = R0-R50; 2 = R50-R100; 3 = R100-R150; 4 = R150-R200; 5 = R200-R250; 6 = R250-R300; 7 = R300-R350; 8 = R350-R400; 9 = Over R400. The mean and standard deviation presented in this table is the mean of categories 1 to 9. The higher the mean, the higher the amount of money spent on food

Table 8.22 Hunger risk classification as related to HH income and money spent on food in children aged 1 – 9 years nationally and by province: South Africa 1999

| Hunger risk classification | | Province [Mean (sd)] | | | | | | | | | |
|---|--------------------------|----------------------|--------------------|---------------------|----------------------|--------------------|-------------------|--------------------|---------------------|---------------------|------------------------|
| | | EC | FS | G/TENG | KZN | M/GA | NC | NP | NW | WC | RSA |
| Total n [food secure (n); risk of hunger (n); experience (n)] | | 349 (15;43;291) | 182 (88;24;70) | 337 (125;73;139) | 445 (114;112;219) | 130 (25;34;71) | 128 (17;32;79) | 267 (51;73;143) | 207 (25;51;131) | 318 (125;93;100) | 2363 (585;535;1243) |
| Household income^{\$} | Food secure | 3.6** (1.1) [a] | 2.7** (0.8) [a] | 3.9** (1.4) [a] | 3.7** (1.1) [a] | 4.2** (1.1) [a] | 3.4 (1.1) | 3.8** (1.2) [a] | 3.0** (0.7) [a] | 4.8** (1.1) [a] | 3.8** (1.3) [a] |
| | At risk of hunger | 2.8 (1.1) [b] | 2.3 (0.6) [b] | 3.1 (1.0) [b] | 2.7 (0.9) [b] | 3.4 (1.0) [b] | 2.8 (1.1) | 3.2 (1.2) [b] | 2.8 (0.8) [a][b] | 3.8 (0.9) [b] | 3.1 (1.1) [b] |
| | Experience hunger | 2.3 (0.8) [c] | 2.2 (0.6) [b] | 2.6 (1.0) [c] | 2.4 (0.8) [c] | 2.7 (1.0) [c] | 2.9 (0.8) | 2.7 (1.0) [c] | 2.5 (0.7) [b] | 3.1 (0.9) [c] | 2.5 (0.9) [c] |
| Total n [food secure (n); risk of hunger (n); experience (n)] | | 328 (14;43;271) | 166 (83;21;62) | 329 (125;72;132) | 416 (106;110;200) | 126 (26;36;64) | 101 (15;25;61) | 222 (38;59;125) | 152 (14;36;102) | 328 (129;94;105) | 2168 (550;496;1122) |
| Money spent on food^{&} | Food secure | 5.7* (3.3) [a] | 3.7** (2.0) [a] | 4.2** (2.4) [a] | 3.8** (2.1) [a] | 4.0** (2.1) [a] | 3.1 (2.8) | 1.9 (1.5) | 3.3 (2.7) | 6.2** (2.2) [a] | 4.3** (2.5) [a] |
| | At risk of hunger | 4.3 (2.9) [a][b] | 2.4 (1.7) [b] | 3.4 (2.3) [b] | 2.5 (1.6) [b] | 3.3 (2.4) [a] | 2.9 (2.4) | 1.8 (1.4) | 2.6 (2.1) | 4.4 (1.9) [b] | 3.1 (2.2) [b] |
| | Experience hunger | 3.5 (2.6)[b] | 2.5 (1.3) [b] | 2.4 (1.5) [c] | 1.9 (1.5) [c] | 2.0 (1.6) [b] | 2.7 (2.0) | 1.6 (1.3) | 2.3 (1.4) | 3.3 (1.8) [c] | 2.6 (2.0) [c] |

*Kruskal-Wallis test for three samples; significant for $P < 0.05$; **Kruskal-Wallis test for three samples, significant for $P < 0.01$; [a]; [b] and [c]: different symbols indicate which means (comparing the three risk groups) are significantly different, Bonferroni multiple comparison test, $p < 0.05$; ^{\$}Household income (per month): 1 = None; 2 = R100-R500; 3 = R500-R1000; 4 = R1000-R3000; 5 = R3000-R5000; 6 = Over R5000. The mean and standard deviation presented in this table is the mean of categories 1 to 6. The higher the mean, the higher the monthly income & Money spent on food (per week): 1 = R0-R50; 2 = R50-R100; 3 = R100-R150; 4 = R150-R200; 5 = R200-R250; 6 = R250-R300; 7 = R300-R350; 8 = R350-R400; 9 = Over R400. The mean and standard deviation presented in this table is the mean of categories 1 to 9. The higher the mean, the higher the amount of money spent on food